

DESOTO, INC.
MATERIAL SAFETY DATA SHEET
FOR COATINGS, RESINS, AND RELATED MATERIALS
(APPROVED BY US DEPARTMENT OF LABOR "ESSENTIALLY SIMILAR" TO FORM OSHA-20)
SECTION I
DESOTO, INC.
ADMINISTRATIVE AND RESEARCH CENTER
EMERGENCY TELEPHONE (312) 391-9000
1700 S. MT. PROSPECT ROAD
DES PLAINES, ILLINOIS 60018
NPCA 1-72

PRODUCT CLASS SOLVENT
MANUFACTURERS CODE IDENTIFICATION 020X343
TRADE NAME SOLVENT REDUCER
SUPERSEDES 11/16/81 MSDS
DATE OF PREPARATION 08/23/82

DMB 2104 TY2
***** SECTION II-HAZARDOUS INGREDIENTS *****

INGREDIENT	% BY* WEIGHT	PPM	TLV	MG/CU.M	LEL	VAPOR PRESSURE @ 20 DEG C
N-BUTANOL-SKIN	15.0	50		150	1.4	4.3
TOLUENE-SKIN	20.0	100		375	1.2	35
METHYL ETHYL KETONE	35.0	200		590	1.8	70
CYCLOHEXANONE	5.0	25		100	1.1	3.4
ISOPROPANOL-SKIN	10.0	400		980	2.0	32
2-ETHOXYETHYL ACETATE-SKIN **	15.0	50		270	1.8	2.0

* PERCENT BY WEIGHT:
TO NEAREST 5%, PLUS OR MINUS 5%, FOR SUBSTANCES 5-95%;
<5.0 FOR SUBSTANCES 0.5-5.0%;
<0.5 FOR SUBSTANCES 0.0-0.5%.

** ACGIH NOTICE OF INTENDED CHANGE, 1982: TLV-TWA=5PPM
NE = NOT ESTABLISHED
NA = NOT APPLICABLE

***** SECTION III-PHYSICAL DATA *****

PROPERTY	MEASUREMENT
BOILING RANGE	176.0 TO 313.0 DEG F. 80.0 TO 157.0 DEG C. @760 MM HG
VAPOR DENSITY	X HEAVIER LIGHTER THAN AIR
WEIGHT PER GALLON	7.0 LBS.
PERCENT VOLATILE BY VOLUME	100.0
EVAPORATION RATE	FASTER X SLOWER THAN ETHER

08/23/82

***** SECTION IV-FIRE AND EXPLOSION DATA *****

DOT CATEGORY FLAMMABLE LIQUID FLASH POINT 22.0 DEG F.
OSHA CATEGORY FLAMMABLE LIQUID-CLASS I B (CLOSED CUP) -5.6 DEG C.

LOWER EXPLOSIVE LIMIT SEE II

EXTINGUISHING MEDIA: USE NATIONAL FIRE PROTECTION ASSOCIATION CLASS B
EXTINGUISHERS (CARBON DIOXIDE, DRY CHEMICAL OR FOAM).

UNUSUAL FIRE AND EXPLOSION HAZARDS: KEEP CONTAINERS TIGHTLY CLOSED. ISOLATE FROM HEAT, ELECTRICAL EQUIPMENT, SPARKS AND OPEN FLAME. CLOSED CONTAINERS MAY EXPLODE WHEN EXPOSED TO EXTREME HEAT. DO NOT APPLY TO HOT SURFACES.
SPECIAL FIRE FIGHTING PROCEDURES: WATER SPRAY MAY BE INEFFECTIVE. WATER MAY BE USED TO COOL CLOSED CONTAINERS TO PREVENT PRESSURE BUILD-UP AND POSSIBLE AUTO IGNITION OR EXPLOSION WHEN EXPOSED TO EXTREME HEAT. IF WATER IS USED, FOG NOZZLES ARE PREFERABLE. WEAR NIOSH APPROVED SELF-CONTAINED BREATHING APPARATUS AND PROTECTIVE CLOTHING TO PREVENT CONTACT WITH SKIN.

***** SECTION V-HEALTH HAZARD DATA *****

THRESHOLD LIMIT VALUE: SEE II (NOT ESTABLISHED FOR PRODUCT)

EFFECTS OF OVEREXPOSURE:

INHALATION: ANESTHETIC. IRRITATION OF THE RESPIRATORY TRACT OR ACUTE NERVOUS SYSTEM DEPRESSION CHARACTERIZED BY HEADACHE, DIZZINESS, STAGGERING GAIT, CONFUSION, UNCONSCIOUSNESS OR COMA.

SKIN OR EYE CONTACT: PRIMARY IRRITATION.

OTHER HEALTH EFFECTS:

REPRODUCTIVE AND BLOOD DISORDERS AND BIRTH DEFECTS HAVE BEEN OBSERVED IN TESTS ON LABORATORY ANIMALS WITH 2-METHOXYETHANOL, 2-ETHOXYETHANOL, AND 2-ETHOXYETHYL ACETATE. BECAUSE THIS PRODUCT CONTAINS AT LEAST ONE OF THESE SOLVENTS, HANDLING PRECAUTIONS AS OUTLINED IN SECTIONS VIII AND IX SHOULD BE CAREFULLY FOLLOWED TO AVOID OVEREXPOSURE.

EMERGENCY AND FIRST AID PROCEDURES: INHALATION: REMOVE FROM EXPOSURE. RESTORE BREATHING. KEEP WARM AND QUIET. NOTIFY A PHYSICIAN. SKIN CONTACT: WASH AFFECTED AREAS WITH WATER. REMOVE CONTAMINATED CLOTHING. CONSULT A PHYSICIAN. EYE CONTACT: FLUSH WITH WATER FOR 15 MINUTES. CONSULT A PHYSICIAN.

INGESTION: CONSULT A PHYSICIAN.

***** SECTION VI-REACTIVITY DATA *****

STABILITY: UNSTABLE X STABLE

INCOMPATIBILITY (MATERIALS TO AVOID):

HAZARDOUS DECOMPOSITION PRODUCTS:
PRODUCTS OF COMBUSTION ARE HAZARDOUS

HAZARDOUS POLYMERIZATION: MAY OCCUR X WILL NOT OCCUR

CONDITIONS TO AVOID:

08/23/82

***** SECTION VII-Spill OR LEAK PROCEDURES*****

STEPS TO BE TAKEN IN CASE MATERIAL IS RELEASED OR SPILLED: REMOVE ALL SOURCES OF IGNITION. AVOID BREATHING VAPORS. VENTILATE AREA. REMOVE WITH INERT ABSORBENT AND NON-SPARKING TOOLS.

WASTE DISPOSAL METHODS: DISPOSE IN ACCORDANCE WITH LOCAL, STATE AND FEDERAL REGULATIONS. INCINERATE IN APPROVED FACILITY. DO NOT INCINERATE CLOSED CONTAINERS.

*****SECTION VIII-SPECIAL PROTECTION INFORMATION*****

RESPIRATORY PROTECTION:

IF EXPOSURE EXCEEDS OCCUPATIONAL EXPOSURE LIMITS INDICATED IN SECTION 11 USE NIOSH APPROVED ORGANIC VAPOR RESPIRATOR. IN CONFINED AREAS USE "NIOSH" APPROVED AIR LINE TYPE RESPIRATORS OR HOODS.

VENTILATION: WHERE EMPLOYEES MAY BE EXPOSED, PROVIDE GENERAL DILUTION OR LOCAL EXHAUST VENTILATION IN VOLUME AND PATTERN TO KEEP TLV OF HAZARDOUS INGREDIENTS IN SECTION II BELOW RECOMMENDED ("ACGIH") OR REGULATED ("OSHA") LIMIT. WHERE EMPLOYEES WILL NOT BE EXPOSED, KEEP LEL IN SECTION II BELOW 25% OF LIMIT

PROTECTIVE GLOVES: BUTYL RUBBER PREFERRED. NEOPRENE OR NITRILE ACCEPTABLE.

EYE PROTECTION: SPLASH PROOF GOGGLES AND/OR FACE SHIELD.

OTHER PROTECTIVE EQUIPMENT:

PROTECTIVE CLOTHING SUCH AS BUTYL RUBBER APRON. NEOPRENE OR NITRILE ACCEPTABLE. A SAFETY SHOWER, AN EYE BATH, AND WASHING FACILITIES SHOULD BE AVAILABLE.

***** SECTION IX-SPECIAL PRECAUTIONS*****

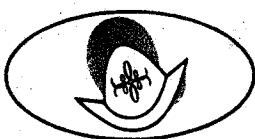
PRECAUTIONS TO BE TAKEN IN HANDLING AND STORING: DO NOT STORE ABOVE 120 DEG. F. STORE LARGE QUANTITIES IN BUILDINGS DESIGNED FOR STORAGE OF FLAMMABLE LIQUIDS.

OTHER PRECAUTIONS: DO NOT TAKE INTERNALLY. CONTAMINATED CLOTHING SHOULD BE WASHED BEFORE REUSE. CONTAINERS SHOULD BE GROUNDED WHEN POURING. AVOID FREE FALL OF LIQUID IN EXCESS OF A FEW INCHES.

DO NOT SAND, FLAME CUT, BRAZE OR WELD THE DRY COATING WITHOUT "NIOSH" APPROVED RESPIRATOR OR APPROPRIATE VENTILATION.

OBSERVE PRECAUTIONARY LABEL WARNINGS.

PREPARED BY: R. A. PROKOP



DeSoto, Inc.

ADMINISTRATIVE AND RESEARCH CENTER

1700 SOUTH MOUNT PROSPECT ROAD, DES PLAINES, ILLINOIS 60018 TELEPHONE 312-391-9000

December 17, 1982

Occupational Safety Dept.
Attn: Industrial Hygiene
Douglas Aircraft Co.
Mail Code: C1-121 (126-14)
3855 Lakewood Boulevard
Long Beach, CA 90846

SUBJECT: 2-ETHOXYETHYL ACETATE

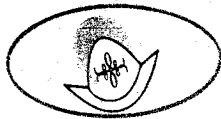
Dear Sirs:

Our records indicate that since January 1, 1982, you have purchased products from DeSoto containing 2-ethoxyethyl acetate. Our suppliers of this product have alerted us to the unpublished results of tests conducted by the National Institute of Occupational Safety and Health (NIOSH). A paper by B.K. Nelson of NIOSH summarizing the findings has been submitted for publication in Teratology.

NIOSH investigated the teratogenic potential of a number of industrial chemicals including 2-ethoxyethyl acetate (also known as ethylene glycol mon-ethyl ether acetate or Cellosolve (R) Acetate). The significant tests on 2-ethoxyethyl acetate were inhalation studies in rats at exposures of 130, 390, and 600 ppm. According to the preliminary findings, the following effects were observed: complete resorption of litters were induced at 600 ppm, reduced fetal weights and skeletal and cardiovascular defects were observed at 390 ppm and a single cardiac malformation was observed at 130 ppm.

For comparison, the current threshold limit value (TLV (R)) as adopted by the American Conference of Governmental Industrial Hygienists (ACGIH) is 50 ppm (8-hour time weighted average). However, ACGIH in June, 1982 has announced a Notice of Intended Change in its recommended TLV to 5 ppm, thus beginning the two year process of evaluating such a change. The current OSHA standard remains at 100 ppm (8-hour TWA).

DeSoto, Inc. is not aware of any evidence indicating that 2-ethoxyethyl acetate has caused reproductive effects in humans. However, because of our belief that knowledge of the most current available information regarding a material's toxicological properties is essential in establishing safe handling procedures, it is our practice to communicate such information to our customers when it becomes known to us.



DeSoto, Inc.

Douglas Aircraft Co.
December 17, 1982
Page two

Enclosed you will find updated Material Safety Data Sheets for DeSoto products you have purchased since January 1, 1982 which contain 2-ethoxyethyl acetate. The Material Safety Data Sheets contain handling procedures which can serve as a basis for the safe handling and use of these products. We recommend that you evaluate your operation to determine if actions are required to reduce employee exposure to 2-ethoxyethyl acetate.

Please insure that this information is given to the person(s) in your company responsible for health and/or safety. If additional information is required, please contact Ms. Carol Robinson of our Corporate Industrial Hygiene Services at 312-391-9547.

Respectfully yours,

DeSOTO, INC.

E.H. Hoerster
Director of Marketing
Chemical Coatings Division

Enclosures: MSDS's for 020-730; 020X304; 020X343; 515X005; 821X331
821X481; 822X324; 822X419; 822X420; 826X321
826X445; 828X310; 910X376; 910X480

cc: R.A. Prokop
C. Robinson